

(Only for new nonprovisional applications under 37 CFR 1.53(b))

Docket No. 004.00191

Total Pages in this Submission

TO THE ASSISTANT COMMISSIONER FOR PATENTS

Box Patent Application

== 0	,					vvasningtoi	n, D.C. 2023 I		
Transm invention				filing under 35	5 U.S	.C. 111(a) and	37 C.F.R. 1.53	(b) is a new utility patent a	application for an
T-TY	YPE	CAL	CIUM CI	HANNEL					7383894 7878 7878 7878 7878 7878 7878 7878 7
and inv	ente	d by							#60 E
Ming									b =
lf a CC	TNC	NUA	TION AP	PLICATION,	chec	ck appropriate b	oox and supply	the requisite information:	
	onti	nuat		Divisional				of prior application No.:	
• ••	onti	nuat	ion 🗆	Divisional		Continuation	-in-part (CIP)	of prior application No.:	
c	onti	nuat	ion 🗆	Divisional		Continuation	-in-part (CIP)	of prior application No.:	
∏Enclos	ed a	are:							
						Application	n Elements		
1.		Filin	g fee as	calculated and	d trar	nsmitted as des	cribed below		
2.	X	Spe	cification	having		86	_ pages and ir	ncluding the following:	
	a.	\boxtimes	Descript	tive Title of the	e Inve	ention			
	b.	\boxtimes	Cross R	eferences to l	Relat	ed Applications	s (if applicable)		
	C.	×	Stateme	ent Regarding	Fede	erally-sponsore	d Research/De	velopment (if applicable)	
	d.		Referen	ce to Microfic	he Ap	opendix <i>(if appl</i>	icable)		
	e.	\boxtimes	Backgro	ound of the Inv	entic	on			·
	f.	\boxtimes	Brief Su	mmary of the	Inve	ntion			
	g.	X	Brief De	scription of th	e Dra	awings <i>(if drawi</i>	ngs filed)		
	h.	X	Detailed	Description					
	i.	\boxtimes	Claim(s)) as Classified	Belo	w			
	j.	\boxtimes	Abstract	t of the Disclo	sure				

UTILITY PATENT APPLICATION TRANSMITTAL (Small Entity)

(Only for new nonprovisional applications under 37 CFR 1.53(b))

Docket No. 004.00191

Total Pages in this Submission

				Application Lientents (Continued)
	3.	×	Dra	awing(s) (when necessary as prescribed by 35 USC 113)
		a.	X	Formal b. Informal Number of Sheets 15
	4.		Oat	th or Declaration
		a.		Newly executed (original or copy)
		b.		Copy from a prior application (37 CFR 1.63(d)) (for continuation/divisional application only)
		C.		With Power of Attorney
		d.		<u>DELETION OF INVENTOR(S)</u> Signed statement attached deleting inventor(s) named in the prior application, see 37 C.F.R. 1.63(d)(2) and 1.33(b).
	5.		The Box	orporation By Reference (usable if Box 4b is checked) e entire disclosure of the prior application, from which a copy of the oath or declaration is supplied under x 4b, is considered as being part of the disclosure of the accompanying application and is hereby proporated by reference therein.
m m	6.		Con	mputer Program in Microfiche
	7.	\boxtimes	Ger	netic Sequence Submission (if applicable, all must be included)
" H"") E		a.	\boxtimes	Paper Copy
ļ		b.		Computer Readable Copy
		C.		Statement Verifying Identical Paper and Computer Readable Copy
				Accompanying Application Parts
	8.		Assi	ignment Papers (cover sheet & documents)
	9.		37 C	CFR 3.73(b) Statement (when there is an assignee)
1	10.		Eng	glish Translation Document (if applicable)
1	11.		Infor	rmation Disclosure Statement/PTO-1449
1	2.		Preli	liminary Amendment
1	3.	×	Ackr	nowledgment postcard
1	4. [\boxtimes	Cert	tificate of Mailing
				First Class Express Mail (Specify Label No.): EJ147244785US

UTILITY PATENT APPLICATION TRANSMITTAL (Small Entity)

(Only for new nonprovisional applications under 37 CFR 1.53(b))

Docket No. 004.00191

Total Pages in this Submission

		Acc	ompanying Ap	plication Pa	rts (Con	ntinued)		
15. 🗆	Certified Copy	of Priority Do	ocument(s) (if fo	oreign priority	is claim	ed)		
16. 🗆	Small Entity St	:atement(s) -	Specify Numbe	r of Stateme	nts Subn	nitted:		
17. 🗀	Additional Enc	losures (plea	se identify belov	w):				
			Fee Calcula	tion and Tra	nsmitta	l		
For	Para		CLAIMS A	S FILED				
For	#	Filed	#Allowed	#Extra		Rate		Fee
Total Clain	ns	60	- 20 =	40	x	\$9.00		\$360.00
ind p. Clai	ms	13	- 3' =	10	x	\$39.00		\$390.00
Multiple D	ependent Claim	ıs (check if a	pplicable)	<u> </u>				\$0.00
					\$11.11.1		BASIC FEE	\$380.00
	EE (specify pur	rpose)						\$0.00
						TOTAL	FILING FEE	\$1,130.00
☐ A chec ☐ The Co	ck in the amount commissioner is to cribed below. A Charge the amount Credit any ove Charge any acceptance the issuant to 37	nereby author duplicate con nount of rpayment. Iditional filing sue fee set in	rized to charge a py of this sheet as fees required u 37 C.F.R. 1.18	is enclosed. s filing fee. ander 37 C.F.	eposit Ac R. 1.16 a g of the N	ecount No. and 1.17. Notice of All	·	
Dated: Au	igust 26, 1999			Reg Bra P.C Ca Tel	san J. Bragistration aman & I D. Box 35	1a, New Yor 193-3002	3	

TYPE CALCIUM CHANNEL I hereby certify that this Utility Patent Application Transmittal (3 pages) (Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under	To Be Assigned Herewith Unknown Unknown Invention: TYPE CALCIUM CHANNEL Thereby certify that this Utility Patent Application Transmittal (3 pages) (Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	pplicant(s): Ming Li	AILING BY "EXPRES	S MAIL" (37 CFR 1.10)	Docket No. 004.00191
Thereby certify that this Litility Patent Application Transmittal (3 pages) (Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	TYPE CALCIUM CHANNEL Thereby certify that this Litility Patent Application Transmittal (3 pages) (Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	Serial No.	Filing Date	Examiner	Group Art Unit
I hereby certify that this Utility Patent Application Transmittal (3 pages) (Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Line (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	I hereby certify that this Utility Patent Application Transmittal (3 pages) (Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Line (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	To Be Assigned	Herewith	Unknown	Unknown
I hereby certify that this Utility Patent Application Transmittal (3 pages) (Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	I hereby certify that this Utility Patent Application Transmittal (3 pages) (Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	vention:			a 27
is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	TYPE CALCIUM CHANN	VEL		2 3 3 3 8 3 8
(Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 Susan J. Braman	(Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 Susan J. Braman				# N
(Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 Susan J. Braman	(Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 Susan J. Braman				Ö
(Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 Susan J. Braman	(Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 Susan J. Braman				_
is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 Chair	(Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)				
is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 Chair	(Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)				
is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 Chair	(Identify type of correspondence) is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	I haraby cortify that this	T7/*3*4 Th 4 4 A 15 45 17		
is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	nereby certify that this	Utility Patent Application 1		
37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)			(Identify type of correspondence)	
37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	to the state of the particular control of			
37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	37 CFR 1.10 in an envelope addressed to: The Assistant Commissioner for Patents, Washington, D.C. 20231 on August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	is being deposited with th	ne United States Postal Ser	rvice "Express Mail Post Office to	Addressee" service under
August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)				
August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Susan J. Braman (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	August 26, 1999 (Date) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Susan J. Braman (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	37 CFR 1.10 in an envelo	pe addressed to: The Assis	stant Commissioner for Patents, W	ashington, D.C. 20231 on
Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) Susan J. Braman (Typed or Printed Name of Person Mailing Correspondence) (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	August 26, 1	999		-
(Typed or Printed Name of Person Mailing Correspondence) Suce D. Brome (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	(Typed or Printed Name of Person Mailing Correspondence) Suce D. Brome (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	(Date)			
(Typed or Printed Name of Person Mailing Correspondence) Suce D. Brome (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	(Typed or Printed Name of Person Mailing Correspondence) Suce D. Brome (Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)		•	Susan I Bran	***
Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)	Signature of Person Mailing Correspondence) EJ147244785US ("Express Mail" Mailing Label Number)				
EJ147244785US ("Express Mail" Mailing Label Number)	EJ147244785US ("Express Mail" Mailing Label Number)				ming contagnation,
EJ147244785US ("Express Mail" Mailing Label Number)	EJ147244785US ("Express Mail" Mailing Label Number)				
("Express Mail" Mailing Label Number)	("Express Mail" Mailing Label Number)			Suse J. A	Bram
				(Signature of Person Mailing Co	Gramorrespondence)
Note: Each paper must have its own certificate of mailing.	Note: Each paper must have its own certificate of mailing.			-	-
Note: Each paper must have its own certificate of mailing.	Note: Each paper must have its own certificate of mailing.			EJ1472447851	US
Note: Each paper must have its own certificate of mailing.	Note: Each paper must have its own certificate of mailing.			EJ1472447851	US
Note: Each paper must have its own certificate of mailing.	Note: Each paper must have its own certificate of mailing.			EJ1472447851	US
Note: Each paper must have its own certificate of mailing.	Note: Each paper must have its own certificate of mailing.			EJ1472447851	US
				EJ1472447851	US
			Note: Each paper must h	EJ1472447851 ("Express Mail" Mailing Lab	US
			Note: Each paper must h	EJ1472447851 ("Express Mail" Mailing Lab	US
			Note: Each paper must h	EJ1472447851 ("Express Mail" Mailing Lab	US
			Note: Each paper must h	EJ1472447851 ("Express Mail" Mailing Lab	US
			Note: Each paper must h	EJ1472447851 ("Express Mail" Mailing Lab	US
			Note: Each paper must h	EJ1472447851 ("Express Mail" Mailing Lab	US
			Note: Each paper must b	EJ1472447851 ("Express Mail" Mailing Lab	US

CERTIFICATE OF MA	AILING BY "EXPRESS	MAIL" (37 CFR 1.10)	Docket No. 004.00191
Serial No.	Filing Date	Examiner	Group Art Unit
To Be Assigned	Herewith	Unknown	Unknown
nvention:			D T T
-TYPE CALCIUM CHANN	Æ L		38389
			10 E
I hereby certify that this	Specification, Claims and Abs	stract (86 pgs) w/Seq Listing (19 pg (Identify type of correspondence)	rs)
		ce "Express Mail Post Office to Ad	
August 26, 1 (Date)	ope addressed to: The Assista 1999	ant Commissioner for Patents, Was	shington, D.C. 20231 on
August 26, 1	ope addressed to: The Assista		
August 26, 1	ope addressed to: The Assista	Susan J. Brama (Typed or Printed Name of Person Mailin	n
August 26, 1	ope addressed to: The Assista	Susan J. Brama	n
August 26, 1	ope addressed to: The Assista	Susan J. Brama	n ng Correspondence)
August 26, 1	ope addressed to: The Assista	Susan J. Brama (Typed or Printed Name of Person Mailin	ng Correspondence) Lan- respondence)
August 26, 1	ope addressed to: The Assista	Susan J. Brama (Typed or Printed Name of Person Mailin Susa J. (Signature of Person Mailing Corn	n ng Correspondence) Samerespondence)
August 26, 1		Susan J. Brama (Typed or Printed Name of Person Mailin Susa J. 2 (Signature of Person Mailing Corn EJ147244785US	n ng Correspondence) Samerespondence)
August 26, 1		Susan J. Brama: (Typed or Printed Name of Person Mailin Susan J. Brama: (Typed or Printed Name of Person Mailing Corn EJ147244785US ("Express Mail" Mailing Label	n ng Correspondence) Samerespondence)
August 26, 1		Susan J. Brama: (Typed or Printed Name of Person Mailin Susan J. Brama: (Typed or Printed Name of Person Mailing Corn EJ147244785US ("Express Mail" Mailing Label	n ng Correspondence) Samerespondence)
August 26, 1		Susan J. Brama: (Typed or Printed Name of Person Mailin Susan J. Brama: (Typed or Printed Name of Person Mailing Corn EJ147244785US ("Express Mail" Mailing Label	n ng Correspondence) Sean
August 26, 1		Susan J. Brama: (Typed or Printed Name of Person Mailin Susan J. Brama: (Typed or Printed Name of Person Mailing Corn EJ147244785US ("Express Mail" Mailing Label	n ng Correspondence) Sean
August 26, 1		Susan J. Brama: (Typed or Printed Name of Person Mailin Susan J. Brama: (Typed or Printed Name of Person Mailing Corn EJ147244785US ("Express Mail" Mailing Label	n ng Correspondence) Sean

	AILING BY "EXPRESS I	MAIL" (37 CFR 1.10)	Docket No. 004.00191
Serial No. To Be Assigned	Filing Date Herewith	Examiner Unknown	Group Art Unit Unknown
nvention: -TYPE CALCIUM CHANN	ÆL .		U.S. PTO 883894
			20 S
I hereby certify that this	Drawings (15 sheets)	(Identify type of correspondence) ce "Express Mail Post Office to	Addressee" service under
	ope addressed to: The Assista	nt Commissioner for Patents, V	
		Susan J. Bra	man
		(Typed or Printed Name of Person M	ailing Correspondence)
		Juan J.	Brane
		(Signature of Person Mailing	Correspondence)
		EJ147244785	-

Note: Each paper must have its own certificate of mailing.